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ABSTRACT

Characteristics of gifted children and identification procedures as well as educational provisions for gifted children in the United States, the United Kingdom, and Australia are discussed in this seminar paper. Ways to modify curricula and ways programs have been enriched for gifted students are pointed out. In the final section of the paper very recent developments in gifted education in the forementioned countries are summarized. (Author/RH)

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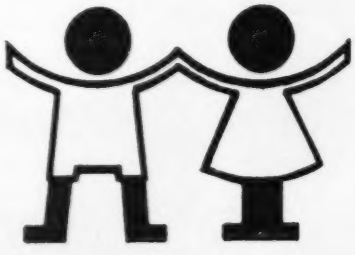

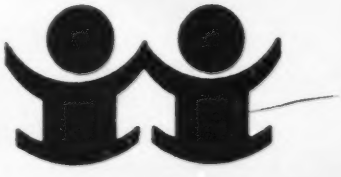

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RECENT TRENDS IN THE EDUCATION OF GIFTED CHILDREN IN THE UNITED STATES OF AMERICA, THE UNITED KINGDOM & AUSTRALIA

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RECENT TRENDS IN THE EDUCATION OF GIFTED CHILDREN IN THE UNITED STATES OF AMERICA, THE UNITED KINGDOM AND AUSTRALIA

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"From each according to his abilities,
to each according to his needs".

KARL MARX

INTRODUCTION

The quotation above is often bandied about by educationists and the essence of it cited in school syllabuses, yet in the so-called egalitarian society in which we live, the needs of gifted and talented children have been sadly neglected by the State. In fact, the emphasis has been given to slower learning children and the associated problems of social, emotional or cultural deprivation.[1] In the process there has often been a levelling of educational standards, although those labelled as "progressives" are able to defend standards and support their statements by reference to test results. Certainly, the overall standard of our secondary students has improved, but in the process, many of our gifted children have become frustrated. The gifted child may also be handicapped because he or she is different. The following comments provide some indication of the problems these children may face:

" ... At school, I get fed up waiting for others to catch up ... "

"I am a very deep thinker and spend hours pondering over various books on philosophy, sociology and world religions ... As a rule I find I cannot get on with people of my own age."

"I sometimes feel a bit of a social outcast ... an outsider."

" ... being ostracised by classmates seems to be a common problem .. and attempting to be 'one of the crowd' ... seems a common remedy."[2]

Very few people can work in isolation without support and encouragement. An inquiring mind, so characteristic of the gifted, requires guidance, stimulus and direction. Such children need the security and support of their parents, the guidance and inspiration of their teachers, and the attention of caring individuals who wish each gifted child to reach his or her potential.

Unfortunately, there is often a paradox in our society whereby an exceptional footballer, swimmer or tennis player receives acclaim but not the outstanding thinker, scientist, actor or mathematician. A unique opportunity is provided to enable each gifted child to make a worthwhile contribution to society.

What is Meant by the Terms "Gifted Children" and "Talented Children"?

> "'Gifted Children' means children ... who are endowed by nature with high intellectual capacity, and who have a native capacity for high potential intellectual attainment and scholastic achievement."[3]
>
> "'Talented Children' means ... (those) who have demonstrated superior talents, aptitudes, or abilities, outstanding leadership qualities and abilities, or consistently remarkable performance in the mechanics, manipulative skills, the art of expression of ideas, oral or written, drama, music, art, human relationships or any other worthwhile line of human achievement."[4]

This distinction between "gifted" and "talented" has a reasonable degree of acceptance among educationists in the United States, but in the United Kingdom researchers usually prefer not to make such a distinction. Instead they group both under the title of "giftedness".[5]

Eric Ogilvie, in defining his understanding of "giftedness" in primary school children for the British Schools Council, suggests that to be gifted is to be outstanding in either general or specific abilities in either a relatively broad or a narrow field. Within this broad definition, six areas may be considered. They are:

1. High Intelligence
2. Creativity
3. Outstanding Leadership
4. Visual and Performing Arts
5. Extraordinary Physical Talent
6. Mechanical Ingenuity

In New South Wales, the Committee appointed by the Minister for Education to enquire into the Education of the Talented Child accepted the following definition of "talented":

> "Talented students are an atypical group possessing exceptional abilities and capable of outstanding performances."[6]

Such a definition, in principle, provides for a comprehensive range of talents. In practice, most attention is given to the intellectually gifted, and this is where the focus of this paper lies. Consideration will be given to the characteristics of intellectually gifted children, procedures for identifying them, and provisions which are currently available for their education.

IDENTIFICATION OF GIFTED CHILDREN

Characteristics of the Gifted

By a combination of several procedures, including parental observations, perception and understanding by the teacher, objective and subjective assessment, it is possible to identify gifted children. The list provided below is designed to assist both teachers and parents in their recognition of giftedness. Exceptionally able children are likely to show many of the following characteristics. A child showing most characteristics, but not those starred, is possibly a gifted child who is under-achieving educationally.

Check List for Parents and Teachers

1. Possesses extensive general knowledge
2.* Has quick mastery and recall of information
3. Has exceptional curiosity
4. Shows good insight into cause-effect relationship
5. Asks many provocative searching questions
6. Easily grasps underlying principles and needs the minimum of explanation
7. Quickly makes generalisations
8. Often sees unusual, rather than conventioanl relationships
9. Listens only to part of the explanation
10. Jumps stages in learning
11. Leaps from the concrete to the abstract
12. Is a keen and alert observer
13. Sees greater significance in a story or film, etc.
14. When interested becomes absorbed for long periods
15.* Is persistent in seeking task completion
16. Is more than usually interested in "adult" problems such as religion and politics
17. Displays intellectual playfulness: fantasises, imagines, manipulates ideas
18. Is concerned to adapt and improve institutions, objects, systems
19. Has a keen sense of humour; sees humour in the unusual
20. Appreciates verbal puns, cartoons, jokes, etc.
21. Criticises constructively
22. Is unwilling to accept authoritarian pronouncements without critical examination
23. Mental speed faster than physical capabilities
24 Prefers to talk rather than write
25. Day dreams
26. Reluctant to practice skills already mastered
27* Reads rapidly and retains what is read
28. Has advanced understanding and use of language
29. Shows sensitivity
30. Shows empathy towards others
31.* Sees the problem quickly and takes the initiative

When this list was presented to a number of parents and teachers who considered their children or pupils to be gifted[8], the results of the survey indicated that those in secondary schools showed many of the characteristics, whilst primary children particularly displayed quick mastery and recall of information, were keen and alert observers, became absorbed for long periods when interested, and had a keen sense of humour. All age groups displayed intellectual playfulness and imagination, read rapidly and retained what was read, had advanced understanding and use of language and showed sensitivity. The older age groups, however, did not display the curiosity expressed by the younger children, nor were they so persistent in seeking task completion. Furthermore, the younger age group was less likely to day dream than the older pupils. Interest in religion and politics was rare among primary children. But no age group was particularly interested in either improving institutions and systems or criticising constructively. Nor was any group observed as leaping easily from the concrete to the abstract or being able to make generalisations quickly. Neither was there any overall reluctance to practice skills already mastered. The fact that these gifted pupils were finding some difficulty in making generalisations quickly and thinking abstractly, that they were prepared to accept certain things uncritically and to persist with skills already mastered, suggests insufficient stimula-

tion in both the school and home environments to foster important thinking skills. This could account also for the number of gifted underachieving children not only in the present situation but also in the past. Those whose ability was unrecognised in childhood included Darwin, Jung, Einstein, and Chatterton as well as Rodin, Tolstoy and Goldsmith. Tolstoy, for example, was regarded by his teachers as "both unable and unwilling to learn". Goldsmith, on the other hand, was told he was "a stupid heavy blockhead, little better than a fool". Einstein was described by one of his teachers as "mentally slow, unsociable and adrift forever in his foolish dreams".[9]

Research conducted by Dr Diane Brotherton of the Melbourne Institute of Early Childhood Development suggests that parents are much better than teachers in recognising giftedness in young children. In one case study, 76 per cent of parents correctly guessed their children were gifted but only 4 per cent of the teachers' guesses were correct.[10] The reason is possibly that parents pay more attention to the child's individual behaviour, whilst teachers place a lot of emphasis on how well the child relates to the group. Furthermore, there is a tendency for teachers to rate highly pupils who are persevering, conforming and industrious.

The best pre-school experience is provided in a secure and loving environment which has provided opportunities for enrichment, creativity and exploration. Such experiences will help the child to be mature, socially well adjusted and verbally fluent. An enriched environment is one which has articulate adults prepared to talk to the child, read to him or her, and one which has introduced the child to a variety of sensual experiences. Where children become frustrated by their environment, their behaviour will usually show aggression, emotional maladjustment, disruptive behaviour and excessive attention seeking.[11] Research studies indicate that failure to provide a stimulating environment for highly intelligent children may lead to serious psychological problems.[12] The experiences gained in the first five years of the child's life seem to have a profound effect on his or her later development. Home enrichment, therefore, must play a vital role. This includes parent's reading to the child, plenty of books, exposure to a wide range of experiences and the opportunity to work on his or her own hobbies. In the primary school, there is much needed contact with children of comparable intellectual level.[13] Furthermore, opportunities should be provided both in the school situation and at home to develop thinking skills. To assist the process of innovative thinking, Edward de Bono[14] and others[15] have produced a good deal of material which both teachers and parents will find useful.

Identification Procedures

Various testing procedures have been adopted in the United States of America, the United Kingdom and Australia. The most successful tests developed for identification purposes are in mathematics, verbal reasoning and general vocabulary development although tests are now being designed in a number of other areas, such as concept understanding in History.

A guide for both parents and teachers in understanding some of the tests used in the identification of gifted children has been written by Richard Fortua and Bruce Boston.[16] The tests described include the WISC-R, Stanford Achievement Test, California Short-Form Test of Mental Maturity, Tennessee Self-Concept Scale, Scales for Rating Behavioural Characteristics of Superior Students and the Torrance Tests of Creative Thinking. Intelligence tests favour the convergent thinker whilst creativity tests display a bias towards the divergent thinker. Both types of tests should, therefore, be applied to assist in the identification process.

The most ambitious project to date on identification of potential giftedness by intelligence tests was that launched by Lewis Terman of Stanford University in 1921. He developed the Stanford-Binet intelligence test. His aim was to prove that highly intelligent children would also be highly intelligent adults.[17] One out of three children chosen in the experiment was from a professional family. It is not surprising, therefore, that the great majority in the Terman study have done well in their careers. However, there were no "Einsteins' or really creative individuals in the group. Terman's findings, moreover, did not make him an advocate of special education for the gifted or lead him "to argue that special abilities require a special kind of nurturing".[18] Nevertheless, recent studies conducted by the United States Office of Education substantiate the attitudes expressed by underachieving "bright" children already mentioned. These children "forced to endure routine curricula may turn off, tune out, day dream, or become "behaviour problems".[19] Furthermore, several studies have found that gifted students account for up to 20 per cent of high school dropouts. The conclusion reached is that intellectual and creative talent cannot survive emotional neglect and apathy.

EDUCATIONAL PROVISIONS FOR GIFTED CHILDREN

The major types of provisions[20] can be classified as acceleration, segregation or enrichment. Examples of each of these types are given below:

1. *Acceleration*

(a) By early admission
(b) Grade skipping
(c) Grade telescoping or intermediate classes
(d) Continuous progress - non-grading
(e) Additional courses in High School and early admission to Universities
(f) Advanced placement

2. *Segregation*

(a) In separate schools, full-time
(b) Grouping or streaming according to ability. This is also referred to as "multi-track", or differentiated instruction
(c) Specialisation by multiple curricula, options or electives
(d) Setting
(e) In special classes part of the time
(f) Summer or Saturday schools; extracurricular interest groups

3. *Enrichment*

(a) Individual study, or small-group work within classes
(b) Library or resource room projects
(c) Use of community resources

Probably the most successful acceleration programmes in the U.S.A. have been in Mathematics, the chief proponent being Julian Stanley, an educational psychologist at John Hopkins University, Baltimore. Those chosen for Mathematics acceleration in seventh and eighth grades were subjectd to a difficult test of mathematical reasoning ability augmented by a test of reading comprehension and vocabulary.[21] Julian Stanley claimed that 10 and 12 year olds selected for the programme have been able to score highly on standardised achievement tests based on 600 hours (4½ years) precalculus Mathematics (Algebra I through analytic Geometry) in approximatley 40 hours of instruction and testing.[22] Students with similar intellectual ability who passed through the slower-paced regular programme did not achieve as highly as those

who were exposed to the concentrated course of study.

A recent comprehensive review of literature conducted by S.P. Daurio[23] in the United States indicated that not a single substantial study has found the educational acceleration of intellectually talented youth harmful. Also, Daurio could locate almost no studies of educational enrichment that found it as effective as acceleration. Apparently, successful subject matter enrichment at one level must lead to acceleration later in order to avoid boring the student and causing him or her to lose interest in the subject. Stanley's proposal in the area of Mathematics is "for a longitudinal teaching team that spans kindergarten through the 11th grade in a school system ... Each student would be helped to meet clearly stated, rather substantial criteria of mathematical competence".[24]

In relation to segregation of gifted students or streaming, it is possible to develop a curriculum that is qualitatively different. Each aspect of the curriculum, therefore, must satisfy two criteria: it must be different in quality from the usual curriculum and it must build upon and extend the unique characteristics of gifted children, including such general clusters of behaviour as learning motivation, creativity and leadership.[25]

To make the basic curriculum more appropriate for gifted students, one can modify the *content* (for example, what is learned) the *process* (for example, the methods used and the thinking processes students are expected to use), and the *learning environment* (e.g. the psychological and physical environment in which the learning is to occur).

Curriculum Modification

The first modification one should make in the content presented to gifted children is the degree of abstraction. The major focus of discussions, presentations, lectures and reading material should be upon certain abstract concepts and generalisations. For example, a descriptive report about the three branches of government could be presented. This would be followed by a discussion of concepts and the classification of ideas, objects and events. Generalisations would be then formulated; these would involve two or more concepts.[26]

According to J S Bruner, [27] transfer of learning, memory and understanding of abstract ideas are facilitated if the facts and descriptive information presented are organised around the basic concepts or key ideas to be taught. In other words, instead of studying History chronologically including the French Revolution in one year and the Russian Revolution in another, these would be grouped together as a study of "revolutions". By this method, generalisations about the universal aspects of revolutions can be made more readily than if the study of each example is separated by a year or more of other unrelated or partially related facts. Fortunately, the Seconday Schools Board and the Board of Senior School Studies in New South Wales have initiated curricula in this direction. The new Junior History Syllabus, for example, has introduced a conceptual/thematic approach to teaching content and one of the new Higher School Certificate History courses is *Revolutions*. In addition, the Australian History Syllabus for senior students has a thematic basis. Although these syllabuses relate to all pupils studying History, gifted pupils will find much to stimulate their interests because they have the opportunity to study in detail themes which allow for a high level of abstraction.

The lives of gifted primary children may also be enriched by the study of biographies. The focus should be on such aspects as family background, professional traits and social characteristics. Inclusion of this aspect of a study of people should secure the transfer of useful coping strategies to the children's own lives. There should also be provision for constructive criticism but it should be tempered by the emotional, social and intellectual needs of the children. It must be remembered too, that gifted children often absorb and intellectually understand the conflicts and issues in the world around them, but may lack the maturity to cope with them. A premature awareness of the problems can precipitate these children into assuming responsibilities before they are ready for them.

Some educationists who are particularly conscious of the heightened perception and sensitivity displayed by gifted children, fear they might not be sufficiently emotionally and socially mature to cope with an acceleration programme because of placement with older students. For this reason, these educationists favour enrichment programmes or individualised methods of teaching and learning. These might operate within the normal classroom, streamed or unstreamed, or as extra-curricular activities.

The provision of enrichment programmes or individualised methods of teaching and learning in British primary schools was officially sanctioned in the early 1970's by the Schools Council. Eric Ogilvie of Nene College, Northhampton suggested a "cafeteria" curriculum whereby a diverse range of activities would be offered.[28] The resources needed to cope with the range of activities have been systematically developed by lecturers at Nene College. They include individualised learning materials in four broad subject areas: Mathematics, Environmental Science, Humanities (especially History) and Expressive Arts. To date, 17 packages have been published. Each package from the Schools Council Curriculum Enrichment Project (SCCEP)[29] provides information via slides, tape, facsimile manuscript or print, about a topic area and suggests ways of studying and developing it. The Mathematics material includes many references to *Mathematics in Nature* and introduces topics such as Mendel's laws, number patterns of powers and roots, relations between surface, volume and biological characteristics. The History material is designed to stimulate an awareness of the nature and range of historical evidence and its use in the study of History. It also aims to arouse the imaginative sense of the past. All the SCCEP materials contain open-ended questions[30] and activities which promote study in depth of a given topic. Although the learner may proceed with minimal assistance from the teacher, some adult interest is essential if the child is to produce high quality work.

Nene College also conducts an enrichment programme in its "Saturday" Club which meets fortnightly and provides a range of activities for children in the 6-12 age range. Activities include visits to places of interest, computer programming, art and craft, drama, hobby sessions and visiting speakers on a variety of sophisticated topics.

In the context of "Saturday" Clubs,reference must be made to the National Association for Gifted Children which originally introduced the concept. The Association also organises weekend workshops and holiday courses for children and regional conferences for parents and teachers.[31] Under its auspices, world conferences have been held in San Francisco, Jerusalem and, in 1981, in Montreal. The significance of these conferences is that there is an increasing awareness among educationists that both individually and collectively educational provisions must be made for gifted children. The exchange of ideas hopefully will be productive in stimulating curriculum development in this neglected area.

A teacher, aware of the needs of the gifted primary or junior secondary child who quickly finishes an assignment and wonders what to do next, will

keep a list of all the special projects on which the individual pupil may work when he or she has time to spare. These might include:

1. An index to the classroom library with annotated index-cards about particular books.
2. Use of reference books for investigating a wide range of topics (knowledge of the child's own preferences is invaluable here both to encourage depth and to stimulate new areas of interest).
3. Use of project kits - Jackdaws, Hill of Content facsimilies, What is History? (Schools Council), Gold and Convict Kits (New South Wales Department of Education), Hill End Study (University of Sydney Occasional Paper).[32]
4. Preparing posters; mounting all displays of pictures and reports.
5. Making maps and schematic diagrams (for example, pre-diagrams or histograms) to analyse and explain factual information.
6. Preparing an almanac, a calendar of important events in a particular field, or weather records (using scientific terms as far as possible).
7. Working in a scrapbook on a particular theme.
8. Studying word derivations, synonyms and antonyms.
9. Writing a script for a play or radio programme or an article or story for a magazine.
10. Practising writing various styles of letter.
11. Planning and conducting a panel discussion or a class "parliament".
12. Working out a programme for a class or school assembly.
13. Having chess sets,mathematical and other puzzles, especially crosswords, puzzle books available in the classroom.
14. Boxes of books on a range of topics including historical novels and science fiction.
15. Educational video games.

In summary, it may be asserted that the more the teacher and parent are able fully to engage the interests and purposefully direct the energies of the gifted child the greater will be the gain, not only for the individual child, but also for the teacher, other children and families. Remember, if gifted children are bored they will be as ingenious in their naughtiness as they can be in their constructive activities!

SUMMARY OF VERY RECENT DEVELOPMENTS IN GIFTED EDUCATION IN THE UNITED KINGDOM, THE UNITED STATES AND AUSTRALIA

The United Kingdom

1. Since 1972, annual residential courses have been organised by the Essex Education Authority for 30 gifted primary pupils aged between 8 and 11 years. In 1978, a course for gifted secondary pupils was introduced. Work enrichment schemes are in constant preparation by the central working party of primary and secondary teachers established in 1971. These are tried out in the classroom, modified, and then made available to schools on a trial basis. Most resource material is as yet unpublished.

2. The Education Authorities of Surrey, Somerset, Hertfordshire, Suffolk, Devon and Birmingham have provided courses for teachers, supported weekend and holiday activities for gifted pupils, and/or have appointed advisors or advisory teachers.

3. Special Science projects funded by the Schools Council have been operative in Cleveland and Rotherham.

4. The Lancaster Curriculum Development Centre Project develops curriculum material for teachers who need intellectually challenging work for more able and gifted primary school children.

5. The Department of Education and Science has also sponsored two pieces of research. The first is a study of gifted children in six comprehensive schools;[33] the second is based on twelve schools around Oxford and aims to investigate how effective teachers are in spotting able secondary students in Mathematics, English, Physics, and Modern Languages.

6. Special schools for the gifted in England only exist for the performing arts, for example, the Yehudi Menuhin School, Cheetham's Manchester and Wells Cathedral School, and Royal School of Ballet. In addition, Pimlico Comprehensive School admits 35 gifted musicians each year into a special programme. However, some independent schools, by a highly selective entrance qualification, contain a high proportion of very able children. These include Eton, Winchester, Westminster and Manchester Grammar. Eton, for example, conducts an examination of gifted children in local county schools and provides scholarships for these children to attend preparatory schools which offer a very selective academic education. These children are guaranteed entry into Eton at age 13 years. Other boys, wishing to enter Eton for their secondary education, are subjected to a stringent set of tests and are extensively interviewed for suitability at the age of 10. If successful, these boys are guaranteed a place at Eton. Others still may sit for the scholarship examination at 12.5 years. Fifteen scholarships are awarded and the recipients are called King's Scholars, an historic title accorded these able students by Henry VI.

7. The Thatcher Government's Education No.2 Act requires the Secretary of State to set up an "Assisted Places Scheme" to enable bright children from less well-off homes to attend independent schools. These children will usually enter preparatory schools at the age of 7 or 8 and be prepared for entry into one of the private institutions. The Department of Education and Science will subsidise the fees of those children selected. Entry examinations are conducted by each preparatory school. Subsequently, all entrants to secondary independent schools sit for the Common Entrance Examination at 13. Passes are required in Physics, Chemistry, Biology, English, Mathematics, Latin, French, and General Knowledge.

8. The United World College of the Atlantic, St Donat's Castle, South Glamorgan, Wales - became, in 1971, the first school in the world to abandon national examinations in favour of an international diploma for all its students. Students are selected on their intellectual capabilities.

The International Baccalaureate is administered by the International Baccalaureate Office in Geneva. It fulfils university entry requirements in most countries of the world. Students must sit for 6 subjects. The choice must include *one* from each group. The groups are as follows:

1. Language A - the student's best language. Includes a study of world literature in translation.
2. Language B - English, French, German, Spanish, Italian, Russian, Chinese.

3. The Study of Man - History, Economics, Geography, Politics, Peace Studies, Chinese Studies.
4. The Experimental Sciences - Physics, Chemistry, Physical Science, Biology, Environmental Studies, Marine Science, Photographic Science.
5. Mathematics.
6. Art, Music, a second subject from Groups 2, 3, 4 or 5.

The Atlantic College is one of three international colleges, the others being the Lester Pearson College of the Pacific, British Columbia and the United World College of South East Asia, Singapore. The colleges have two main aims: to promote international understanding through education and to provide a pattern of education adapted to meet the special needs of our time. All the colleges are co-educational and residential and cater for the last two years of secondary education. Based on the principles of Dr Kurt Hahn, the Atlantic College, founded by Air Marshall Sir Lawrance Darvall and Dr Kurt Hahn in 1962, laid the foundations for the other colleges. Their aim is to provide "service to the community".[34]

The United States

In the United States, the initiative was taken in 1972 to establish the Office of Gifted and Talented. Further provisions through the Elementary and Secondary Act of 1975 provided special funds for teacher training, research and State grants in the areas of the gifted and the talented. Furthermore, the 1978 Gifted and Talented Children's Education Act provided $3.8 million to go directly to State education agencies for awards to the local educational agencies. Individual states, too, have begun to see the need for gifted and talented programming, whilst nineteen State consultants devote between 3 per cent and 80 per cent of their time in administering services for the gifted and talented.[35]

Australia

The recently published Schools Commission paper[36] sets out the present provisions in Australia for gifted pupils. Various government educational authorities are making some provision in a limited way.

New South Wales

Opportunity "C" classes have existed since 1932. These classes cater for students in Years 5 and 6 and selection is generally made on the basis of intelligence tests supplemented by teacher nomination. Today, ten primary schools offer OC classes. Twelve selective high schools remain in the state, but not all children from OC classes are able to progress to a selective high school. Selection is based on intelligence tests, along with aptituted assessment in Mathematics and English but a residential qualification applies, that is, selective high schools service particular areas and, if the gifted pupil does not live within the boundaries, then it is unlikely he or she will qualify for placement.

Certain regional directorates of the New South Wales Department of Education have appointed consultants[37] to assist in the development of appropriate programmes for gifted children in state schools. The specific role of the consultant has been designed to be "one of assistance, advice and guidance where it is required and appropriate".[38] School principals and their staffs generally favour a policy of special extension programmes in the context of the normal classroom. Only a minority favour the creation of either special classes or special schools.

Recommendations being considered by departmental officials include the need for a defined school policy regarding talented children, and the need for experimentation, such as horizontal groupings to allow for pupil progression at their ability level rather than at their age level.[39]

Possibly, the most encouraging development in New South Wales, is the introduction of the Vertical Semester Organisation at The Entrance High School. This was introduced in July 1980.[40] The organisation is such that all children can be grouped into semester courses according to ability, interest or talent, irrespective of their age or year of schooling. Once the "form barriers" are broken, automatic sequential grade progression is no longer necessary. When children attempt a semester course they are aware of the concepts, skills and knowledge to be mastered. The children are continually assessed on their individual mastery of the course, and then progress from one course to the next having mastered the course that they have just completed.

Features of the system are two semesters per year where each student takes seven subjects chosen at the start of each semester. English, Mathematics, Science and Social Science must be studied. Vertical grouping widens the subject choice and allows rapid progression for gifted and talented students together with the possibility of enrichment courses. It also allows students with difficulties in a subject to repeat that segment. Time tabling is greatly simplified due to block of time being used. A summary of the system is:

(a) All pupils can select 7 courses for study each semester.
(b) The week is made up of 5 days each with 7 x 44 minute periods. A 35 period week operates.
(c) Each subject is studied for 5 periods per week.
(d) Any pupil in the school, irrespective of year of schooling, can be placed in a class depending upon ability, talent or interest.
(e) Progress is dependent upon the mastery of the subject skills. Where these skills have not been achieved, remediation is necessary before progression.
(f) Some children may need more Mathematics and less Physical Education. This is possible in the Vertical Semester Organisation.

The project is currently funded primarily by the Schools Commission. This suggests that other secondary schools could initiate similar experimental programmes.

Victoria

A special initiative has been the establishment of the Gifted Children's Task Force in 1977 to provide a consultancy service to teachers and schools. Another innovation has been to set up a Primary Division Working Part in 1980 to investigate the needs of gifted primary students. As a result, several enrichment programmes have been introduced.

A pilot programme, involving the acceleration of students through six years of secondary schooling in four years, began in 1981. The high school curriculum has been especially adapted in a selective high school so that thirty students may have the opportunity of acceleration and enter University at a younger age. However, provision has been made also for any pupil to return to the normal rate of progression should he or she find it too dificult to cope with either academic or social pressures or both. The programme will be closely monitored.

Queensland

The Education Department places emphasis on meeting the needs and interests of all students within the existing school structure. Teachers have the support of guidance officers, resource and advisory teachers as well as community participation in enrichment programmes. Some primary schools, however, have provided a withdrawal programme for especially gifted pupils.

South Australia

The Adaptive Education Project was launched in 1976 to assist teachers in their adaptation of curriculum content and teaching methods to provide flexibility in coping with the learning abilities of all students. A policy statement issued by the Education Department in 1979 indicated that gifted students would remain in their neighbourhood schools but necessary curriculum materials would be provided for enrichment and extension.

Western Australia

Publication of a policy document[41] in 1978, alerted teachers, administrators and parents to the need to provide more appropriately for gifted and talented children. As a consequence, each metropolitan region has a programme serving some of its gifted and talented students and, in the country South-West Region, the decentralised special-interest centre offers enrichment courses for primary school children in interest areas on a partial withdrawal basis. Withdrawal classes are also in operation in some metropolitan regions, and consortium arrangements are being developed whereby numbers of primary schools provide for their own gifted and talented pupils and share that responsibility amongst experienced staff.

Specially devised programmes have also been established in eight high schools. All aim at allowing students the opportunity to progress through the secondary curriculum at a rate and to a depth suited to their intellectual ability. Where country students have demonstrated intellectual eligibility for admission to these programmes they will be granted aid under the Isolated Students' Assistance Scheme.

Tasmania

Generally, enrichment activities and withdrawl for short periods of time are favoured methods used by schools. The activities vary from region to region. Science camps however, have been organised in most regions and in the Northern Region primary children have been exposed to enrichment programmes in Mathematics, English, Drama, Social Science and Art. In addition, there is also an annual creative writing camp for students displaying special aptitude in that field.

Australian Capital Territory

No specific guidelines have been written for gifted students although, in 1979, two pilot programmes were introduced for both primary and secondary students. They are currently being evaluated.

Northern Territory

In 1976, a Special Adviser/Gifted Children, was appointed to investigate the particular needs of these students and to provide an advisory service to schools. There are now three full-time personnel working in an advisory capacity with teachers of the gifted.

CONCLUSION

The Schools Commission raises three questions for consideration in relation to providing educational opportunities for gifted students. They are:

(a) Can the provision of special educational services for gifted students be seen as consistent with the goal of schooling being socially comprehensive?

(b) Can extra provision for gifted students be regarded as equitable in terms of equality of opportunity and the encouragement of all children to achieve their full potential?

(c) Are students with special talents really held back by the way their schooling is provided?[42]

Whatever the answers to these questions might be, it is inescapable that governments must face the issue and allow opportunities for the development of curricula for gifted students, provision for research, and evaluation of all programmes in operation. Evaluation procedures should take into account the higher cognitive concepts and processes, the creative and productive behaviour, and the affective growth that are especially appropriate and often unique for gifted and talented persons. Reliance on standardised tests alone, is a much too limited approach to evaluation for such students. Much more attention needs to be paid to their products and their performance in evaluating their development. Educationists in this respect, and approaches to the problem, generally have a lot of thinking to do. Furthermore, innovative ventures need support, and it is most important that information in all programmes be disseminated.

Based on a seminar given at the Summer Saturday Seminars at the University of New South Wales, February, 1981.

NOTES AND REFERENCES

1. Consider Auriol Stevens' viewpoint in *Clever Children in Comprehensive Schools*, Pelican, 1980.

2. Comments made by Gifted Adolescents about themselves: residential course, Essex, June 1978. See B. Wallace, "The Gifted Child in School", *Essex Education*, 33, 3 (Spring 1980), p.49.

3. Delaware State Code, Article 14, Section 3162, 1953. Cited the Seventy-eighth Yearbook of the National Society for the Study of Education, Part 1, 1979: *The Gifted and the Talented: Their Education and Development*, 1979, p. 63.

4. *ibid.*

5. For a comprehensive examination and review of definitions of "giftedness" see the following references:
J.B. Shields, *The Gifted Child*, King, Thomas & Stace for N.F.E.R., 1968.
E. Ogilvie, *Gifted Children in Primary Schools*, Schools Council Research Studies, 1970.
F. Kaufmann, *Your Gifted Child and You*, Council for Exceptional Children, 1976.
M.L. Kellmer-Pringle, *Able Misfits*, Longman, 1970.

6. Quoted in "The Education of the Talented Child". *Report of the Committee Appointed by the Minister for Education to Enquire into the Education of the Talented Child*, Sydney, NSW Department of Education, 1977, p.3.

7. This list combines characteristics that have been observed by a number of researchers and authorities, including Ogilvie, *op cit.*, J Renzulli, *Scale for Behavioural Characteristics of Superior Students*, New York, 1971, and the Department of Education and Science (U.K.), *Gifted Children and their Education*, London, 1979.

8. This list was given to participants at the Conference held by the Unit of Child Studies, University of NSW (February, 1981) and parents and teachers whose children/pupils participated in an experimental programme conducted by the Northern Districts Cooperative Teachers Centre, Cheltenham, NSW.

   In addition, parents and teachers, who have contacted the author in relation to assistance in identification procedures, have contributed to the survey and commented on each item on the list. The predictive value of items in the list has not been validated further than this sample. However, research in the USA is supportive of such findings. See R.A. Martinson, "Children with Superior Cognitive Abilities" in L.M. Dunn (ed), *Exceptional Children in the Schools*, New York, 1973. It is recognised that such lists have obvious inadequacies and limitations but used with understanding, can improve particularly the teacher's subjective observations and supplement the objective assessment provided by the variety of standardised tests used in schools. Longitudinal studies would suggest that motivational factors are important in the actualization of potential and that these are often determined by several experiences.

9. R.S. Illingworth, "Underachieving Children" in *Looking at their Future*, Newsletter of the National Association for Gifted Children, London, 1975.

10. *Sun Herald*, 2 September, 1979.

11. M.L. Kellmer-Pringle, *Able Misfits*, Longman, 1970.

12. R. Solomon, "The Gifted Child - a problem of recognition" in *Looking to their Future*, 1975.

13. Provisions are being made for meeting these special needs by a number of organisations including the New South Wales Association for Gifted and Talented Children and the Northern Districts Cooperative Teachers' Centre, Cheltenham, New South Wales. Guidelines to help teachers and parents identify and interpret outstanding potential in their children may be found in F. Kaufmann *Your Gifted Child and You*, Council for Exceptional Children, 1976.

14. Edward de Bono, *Children Solve Problems*, Penguin, 1972, *The Dog Exercising Machine*, Penguin, 1971, *Lateral Thinking*, Ward Lock Educational, 1970, *Practical Thinking*, Jonathan Cape, 1971.

15. A. Boyce Gibson, A.A. Phillips and Y.A. Larsson, *Thinkers at Work*, Longman Cheshire, 1981.

16. R.O. Fortua and B.O. Boston, *Testing the Gifted Child: An Interpretation in Lay Language*, Council for Exceptional Children, 1976. R.A. Martinson in *The Identification of the Gifted and Talented*, Council for Exceptional Children, 1975, suggests appropriate identification procedures and gives examples of check lists, questionnaires, and other materials used by various school districts in the United States of America. Details of specific tests may also be found in specialist books such as J.H. Flavell *The Development of Role-taking and Communication Skills in Children*, John Wiley and Sons, 1968, pp 42-45; J Rest, *Manual for the Defining Issues Test: An Objective Test of Moral Judgement Development*, University of Minnesota, 1974; and J.D. Ross and C.D. Ross, *Ross Test of Higher Cognitive Processes*, Academic Publications, 1976.

17. A summary of Terman's ambitious study of the gifted is found in Daniel Goleman's article "1,528 Little Geniuses and How They Grew Up" in *Psychology Today* (February 1980), pp 28-43. See also L.M. Terman and M.H. Oden, *The Gifted Group at Mid-Life. Genetic Studies of Genius*, Vol. 5, Stanford University, 1959.

18. B. Rice. "Going for the Gifted Gold", *Psychology Today* (February, 1980) p 55.

19. *Ibid.*

20. P.E. Vernon, G. Adamson & D.F. Vernon, *The Psychology and Education of Gifted Children*, Methuen, 1977.

21. Julian C. Stanley, "On Educating the Gifted", *Educational Researcher*, Vol. 9, No. 3, March 1980, p 8.

22. *Ibid.* p 9.

23. S.P. Daurio, "Educational enrichment versus acceleration: A review of the literature", in W.C. George, S.J. Cohn and J.C. Stanley (eds.) *Educating the Gifted: Acceleration and Enrichment*, John Hopkins University, 1979, pp 13-63.

24. Julian C. Stanley, "On Educating the Gifted", p. 11.

25. C. June Maker, "Curriculum Development for the Gifted: Basic Principles", *New Horizons in Education*, Vol. 64 (Autumn 1981) pp 18-24.

26. See Y.A. Larsson, "Historical Concept Formation in Primary and Secondary Schools", *Coping with Change*, History Teachers' Association of NSW, 1977, pp 50-56.

27. J.S. Bruner, *The Process of Education*, Harvard University, 1960.

28. D.T.E. Marjoram, "Recent Trends in the Education of Gifted Children in England", *New Horizons in Education*, No. 63 (Autumn 1981), pp 2-6.

29. See M.Bell, "Providing for Gifted Children - An Outline of the Work Carried out at Nene College, Northampton", *New Horizons in Education*, No. 64 (Autumn 1981), pp 7-9.

30. Open-ended questions cannot be answered or satisfied with one predetermined "right" answer or solution; they are provocative in that they stimulate further thinking or further study.

31. M. Eakin, "Provisions for Gifted Children in Northern Ireland", *New Horizons in Education*, No. 64 (Autumn 1981), pp 9-12.

32. Y. Larsson, G. Johnston and S. Hurley (eds.) *The Generation of Inter-Disciplinary Materials for Use in Schools: A Case Study Based on Field Work at Hill End*, Vols. I and II. Occasional Paper No 7, University of Sydney, 1980.

33. See Auriol Stevens, *Clever Children in Comprehensive Schools*, Penguin, 1980.

34. *United World College of the Atlantic Handbook* and *Student Prospectus*.

35. James Delisle, "Education of the Gifted: Coming and Going", *The Roeper Review: a Journal of Gifted Education*, 2, 4, p 13.

36. *The Education of Gifted Students* a Discussion Paper, Schools Commission, Canberra, November, 1980, pp 28-36.

37. See *New South Wales Education Gazette*, No. 1, 1981, p 7.

38. *Sydney Morning Herald*, 29 May, 1979.

39. Circular sent to high schools in the Central Metropolitan Directorate, New South Wales Department of Education, 1981.

40. For an account of the programme see, "Semester System. New Concept in Learning", *School Gazette*, 6, 8.

41. *Gifted and Talented Children in Western Australian Schools*, June, 1978.

42. *The Education of Gifted Students.* A Discussion Paper, Schools Commission, Canberra, November 1980, p 40.

BRIEF ANNOTATED LIST OF USEFUL BOOKS

BRIDGES, S.A.(Ed.) *Gifted Children and the Brentwood Experiment.* London: Sir Isaac Pitman & Sons, 1969.

Includes suggestions for activity work in Mathematics, Art with Mathematics, Science and creativity experiments.

BRIDGES, S.A. *I.Q. - 150.* London: Priory Press, 1973.

Deals with problems in the home and what schools, teachers and other organisations can do. Looks at the programme in operation at Millfield School, Somerset, founded by Mr R.J.O. Meyer in 1936.

DEPARTMENT OF EDUCATION AND SCIENCE. *Gifted Children in Middle and Comprehensive Schools.* London: 1977.

Discusses vertical grouping, withdrawal, promotion, acceleration and enrichment. Looks also at provisions being made in each subject area.

GIBSON, J. & CHERRELLS, E. (Eds.) *Gifted Children. Looking at their Future.* London: National Association for Gifted Children, 1976.

Surveys provisions in a number of countries. Has an important chapter entitled, John P Casey and Nancy L Quisenberry, "A Review of the Research Related to Giftedness in Early Childhood Education", pp 88-113.

HOPKINSON, D. *The Education of Gifted Children.* London: Woburn Press, 1978.

Includes Case Studies of Keynes, Wells, Kipling.

PAINTER, F. *Gifted Children. Their relative levels of scholastic achievement and interests: Teachers' Views on their Educational Needs.* Krebworth, Herts: Social Science Research Council, 1977.

Deals with test procedures.

POVEY, R. (Ed.) *Educating the Gifted Child.* London: Harper & Row, 1980.

Chapters on families under stress and suggestions for parents. Individual Case Studies are included.

ROWLANDS, P. *Gifted Children and Their Problems.* London: J. M. Dent & Sons, 1974.

Suggests what parents can do to help. Also case studies are provided.

STEVENS, A. *Clever Children in Comprehensive Schools.* Middlesex: Pelican, 1980.

A very useful book for those undecided on the issue of comprehensive or selective high schools.

TEMPEST, N.R. *Teaching Clever Children 7 - 11.* London: Routledge & Kegan Paul, 1974.

Good chapters for teacher guidance on observation and enquiry, problem solving, imaginative work, and divergent thinking for creativity.

VERNON, P, ADAMSON, G, & VERNON, D. *The Psychology and Education of Gifted Children.* London: Methuen, 1977.

Discusses acceleration, segregation, and enrichment. Also includes samples of divergent thinking tests.